

(19) World Intellectual Property
Organization
International Bureau



(43) International Publication Date
4 August 2005 (04.08.2005)

PCT

(10) International Publication Number
WO 2005/070526 A1

(51) International Patent Classification⁷:
5/02, 15/00

B01F 3/04,

(74) Agent: INNOPAT LTD; P.O. Box 556, FI-02151 Espoo (FI).

(21) International Application Number:

PCT/FI2005/000051

(22) International Filing Date: 26 January 2005 (26.01.2005)

(25) Filing Language:

Finnish

(26) Publication Language:

English

(30) Priority Data:

20040113

27 January 2004 (27.01.2004) FI

(71) Applicant (for all designated States except US): **WATERIX OY** [FI/FI]; Luoteisrinne 5, FI-02270 Espoo (FI).

(72) Inventors; and

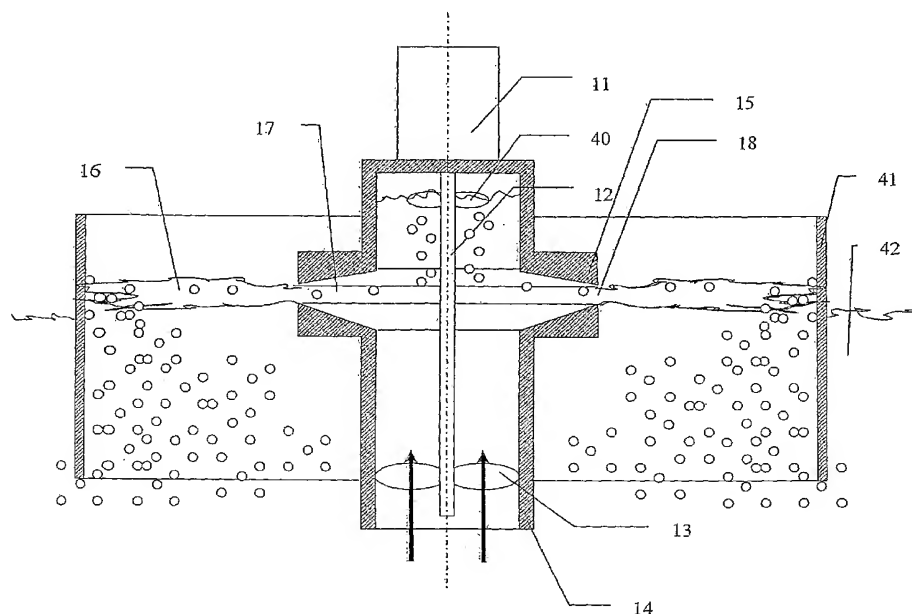
(75) Inventors/Applicants (for US only): **HUHTA-KOIVISTO, Risto** [FI/FI]; Visakoivuntie 17 D, FI-02130 Espoo (FI). **HUHTA-KOIVISTO, Esko** [FI/FI]; Säynävätie 4B, FI-02170 Espoo (FI).

(81) Designated States (unless otherwise indicated, for every kind of national protection available): AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NA, NI, NO, NZ, OM, PG, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, SY, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW.

(84) Designated States (unless otherwise indicated, for every kind of regional protection available): ARIPO (BW, GH, GM, KE, LS, MW, MZ, NA, SD, SL, SZ, TZ, UG, ZM, ZW), Eurasian (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM), European (AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IS, IT, LT, LU, MC, NL, PL, PT, RO, SE, SI, SK, TR), OAPI (BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG).

[Continued on next page]

(54) Title: APPARATUS AND METHOD FOR AERATION/MIXING OF WATER



(57) Abstract: The invention is concerned with an aeration system for aeration and/or mixing of water, which system comprises at least one aeration unit (20) having a pump/propeller (13) inside a feed pipe (14) and a feed pipe, to which the water to be aerated is sucked from beneath. The aeration system is characterized in that, the feed pipe is expanding in the upper part of the aeration unit to a conical space working as a nozzle (17), via which the water continues its way to at least one annular opening (18). The invention is also concerned with a method for aeration and/or mixing of water.

WO 2005/070526 A1



Published:

- with international search report
- before the expiration of the time limit for amending the claims and to be republished in the event of receipt of amendments

For two-letter codes and other abbreviations, refer to the "Guidance Notes on Codes and Abbreviations" appearing at the beginning of each regular issue of the PCT Gazette.